Discussion: Monthly State Level Retail Sales
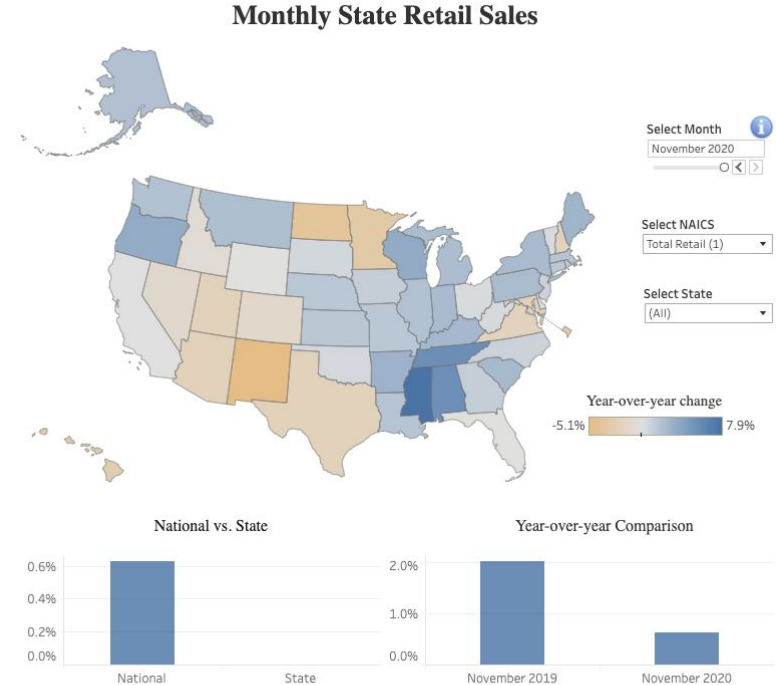
Census Scientific Advisory Committee
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Why This Is A Big Deal

Retail Sales obviously an area of intense focus and effort for forecasting, demand management etc.

Even more attention due to COVID and understanding impacts of the pandemic on retail sales (and shift to e-commerce)

Encourage the committee to play with the nice interactive iframe here - easy to see how cool this data is

Monthly State Retail Sales

Select Month
November 2020

Select NAICS
Total Retail (1)

Select State
(All)

Year-over-year change
-5.1%   7.9%

National vs. State

Year-over-year Comparison

(1) Excludes nonstore retailers

▸ The 90 percent confidence interval includes zero. There is insufficient statistical evidence to conclude that the actual change is different from zero.
Note: State retail sales data not adjusted for seasonal variation, trading-day differences, moving holidays or price changes.

Questions for SMEs

Composite Weighting

- Weights probably matter a lot here, with synthetic estimate requiring heavy assumptions but providing more stability
- Currently choose the weight based on 'share' of total variance, but how much would that different from the weights that minimize MSE for states/sectors where we can measure bias?

Limitations for going further back than January 2019?

- Monthly Retail Trade Report goes back to early 90s
- Potentially very useful since seasonality really matters for retail sales, and won't be recoverable even with levels if only back to early 2019

Responding to Census questions

Additional Data Sources?

- Third Party Data: "Monthly point-of-sales sales data for all establishments in twenty-two large companies"
  - Why just POS data for large companies? If vendor limitations, I wonder about companies that have captured more of the SMB sector

Specific Improvements?

- Discussed the idea of recovering seasonality on the prior slide

Groups or Organizations That Would Benefit?

- Defer to other CSAC members, but obviously retail industry firms/groups and economic forecasting shops